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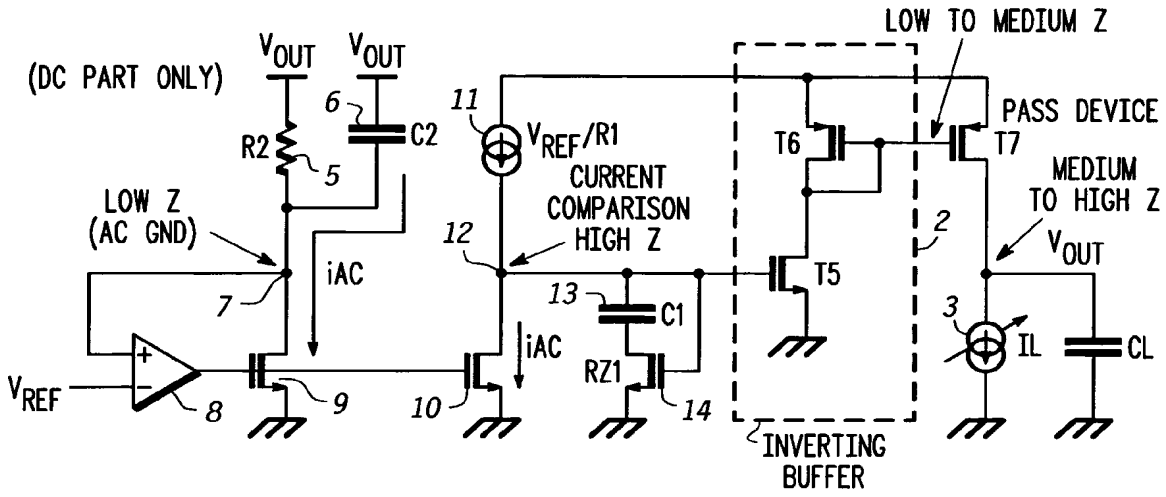
(54) Title: LOW DROP-OUT DC VOLTAGE REGULATOR



(57) Abstract: A low drop-out DC voltage regulator for regulating a voltage from a DC power supply (Vsupply) applied to a load (3) at an output of the regulator and comprising a pass device (T7) for controlling flow of current from the power supply to the load so as to control the output voltage (Vout) at the regulator output, and a feedback loop for controlling the pass device (T7). The feedback loop comprises a resistive (5) and a capacitive (6) feedback path and comparator means responsive to signals from the feedback paths for applying to the pass device (T7) an error signal that is a function of the value of the output voltage (Vout) relative to a reference value so as to control the output voltage (Vout). The comparator means comprises feedback current producing means (8-10) for maintaining a common point (7) of the resistive feedback path (5) and the capacitive feedback path (6) at a reference voltage (Vref) so as to produce a feedback current flowing in the resistive feedback path (5) and in the capacitive feedback path (6) and current comparison means (11) responsive to values of the feedback current and of a reference current (Vref/R1) for producing the error signal.

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